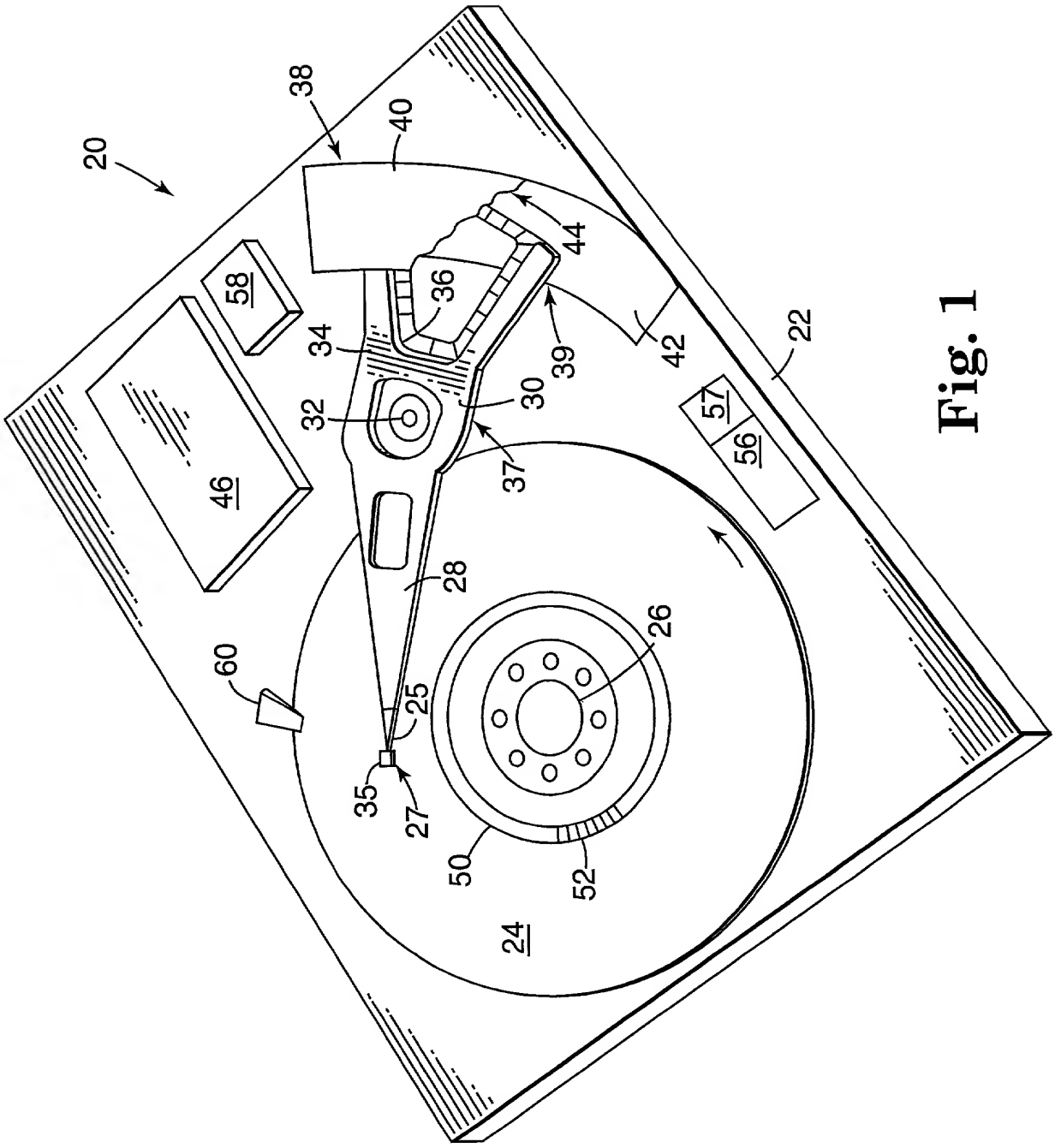
20
38
40
44
58
36
34
39
42
22
32
30
57
56
37
46
28
26
60
25
35
27
50
52
24

Fig. 1

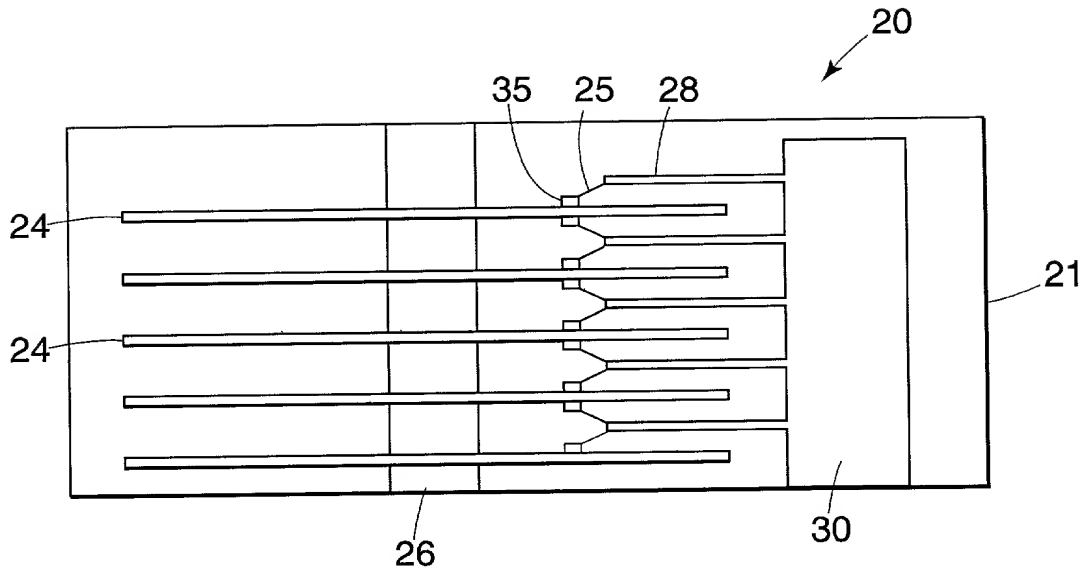

Fig. 2

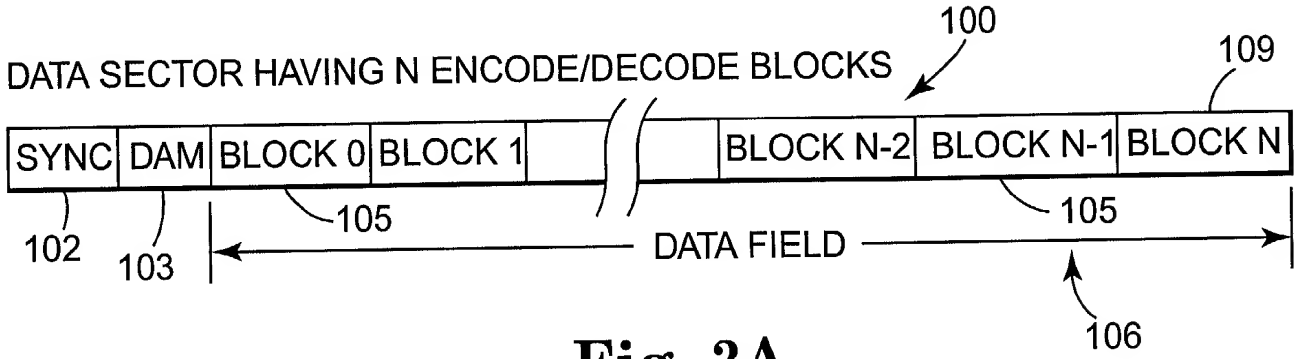
DATA SECTOR HAVING N ENCODE/DECODE BLOCKS
100
109
SYNC
DAM
BLOCK 0
BLOCK 1
BLOCK N-2
BLOCK N-1
BLOCK N
102
103
105
105
DATA FIELD
106

Fig. 3A

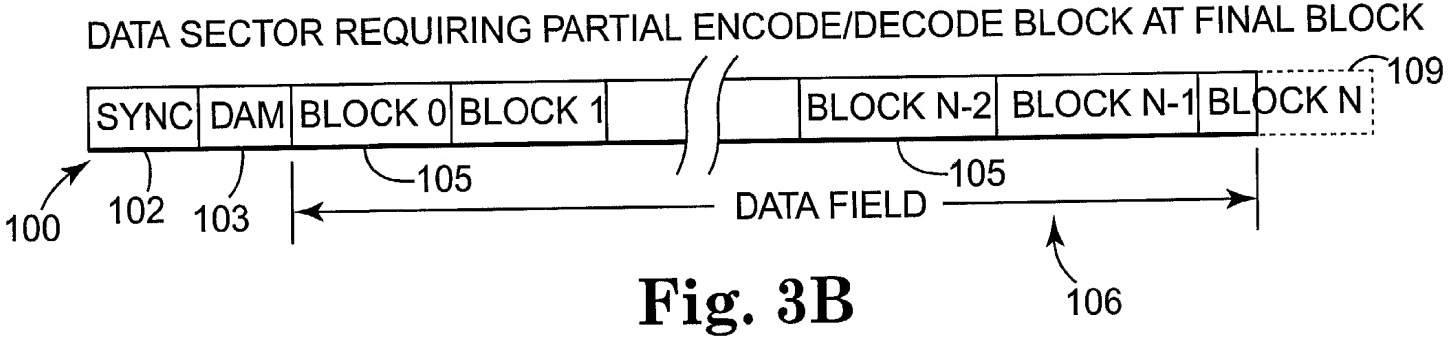
DATA SECTOR REQUIRING PARTIAL ENCODE/DECODE BLOCK AT FINAL BLOCK
109
SYNC
DAM
BLOCK 0
BLOCK 1
BLOCK N-2
BLOCK N-1
BLOCK N
100
102
103
105
105
DATA FIELD
106

Fig. 3B

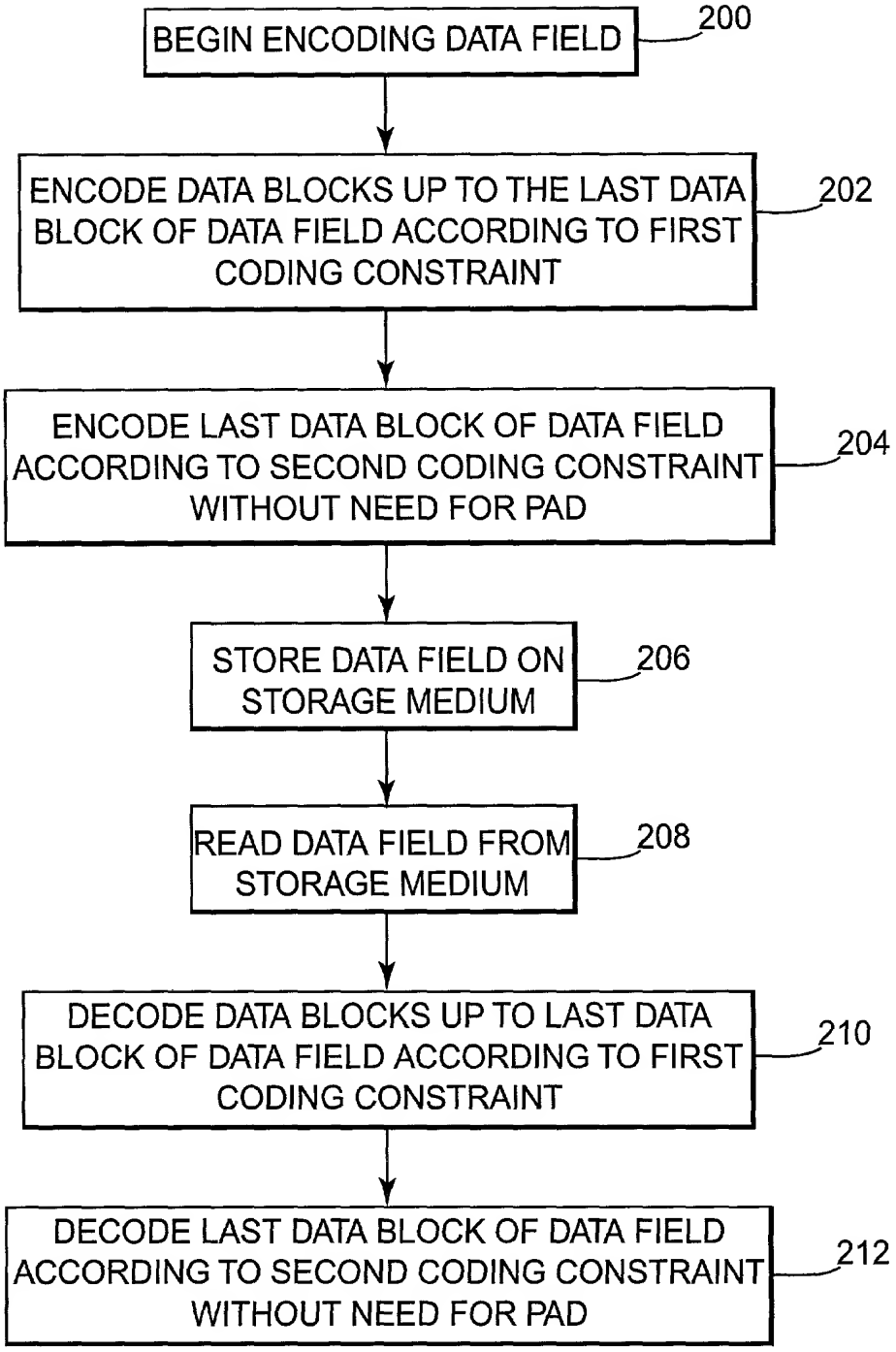
BEGIN ENCODING DATA FIELD
200
ENCODE DATA BLOCKS UP TO THE LAST DATA BLOCK OF DATA FIELD ACCORDING TO FIRST CODING CONSTRAINT
202
ENCODE LAST DATA BLOCK OF DATA FIELD ACCORDING TO SECOND CODING CONSTRAINT WITHOUT NEED FOR PAD
204
STORE DATA FIELD ON STORAGE MEDIUM
206
READ DATA FIELD FROM STORAGE MEDIUM
208
DECODE DATA BLOCKS UP TO LAST DATA BLOCK OF DATA FIELD ACCORDING TO FIRST CODING CONSTRAINT
210
DECODE LAST DATA BLOCK OF DATA FIELD ACCORDING TO SECOND CODING CONSTRAINT WITHOUT NEED FOR PAD
212

Fig. 4

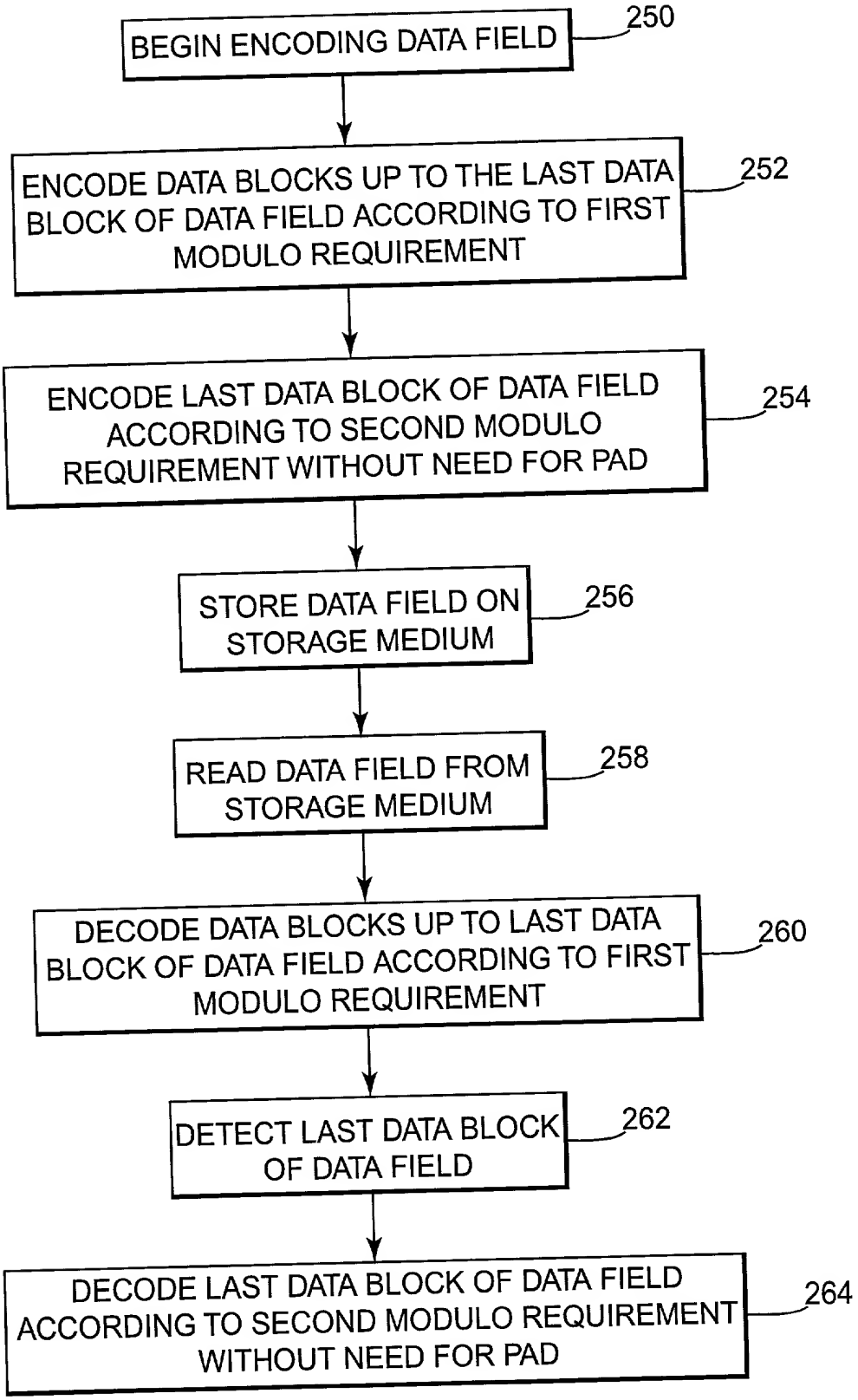
BEGIN ENCODING DATA FIELD
250
ENCODE DATA BLOCKS UP TO THE LAST DATA BLOCK OF DATA FIELD ACCORDING TO FIRST MODULO REQUIREMENT
252
ENCODE LAST DATA BLOCK OF DATA FIELD ACCORDING TO SECOND MODULO REQUIREMENT WITHOUT NEED FOR PAD
254
STORE DATA FIELD ON STORAGE MEDIUM
256
READ DATA FIELD FROM STORAGE MEDIUM
258
DECODE DATA BLOCKS UP TO LAST DATA BLOCK OF DATA FIELD ACCORDING TO FIRST MODULO REQUIREMENT
260
DETECT LAST DATA BLOCK OF DATA FIELD
262
DECODE LAST DATA BLOCK OF DATA FIELD ACCORDING TO SECOND MODULO REQUIREMENT WITHOUT NEED FOR PAD
264

Fig. 5

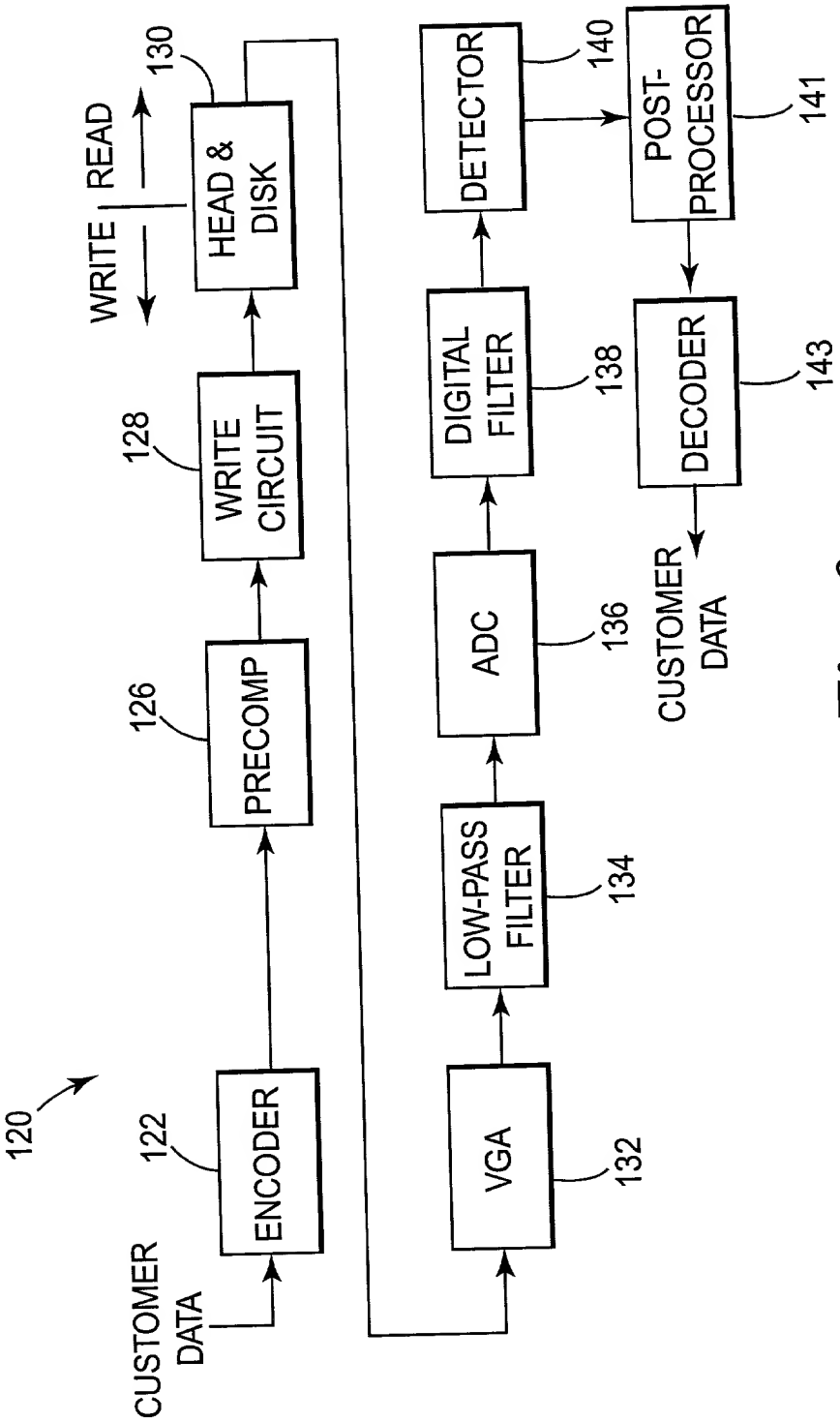
120
CUSTOMER DATA
122
ENCODER
126
PRECOMP
128
WRITE CIRCUIT
WRITE
READ
130
HEAD & DISK
VGA
132
LOW-PASS FILTER
134
ADC
136
DIGITAL FILTER
138
DETECTOR
140
POST-PROCESSOR
141
DECODER
143
CUSTOMER DATA

Fig. 6

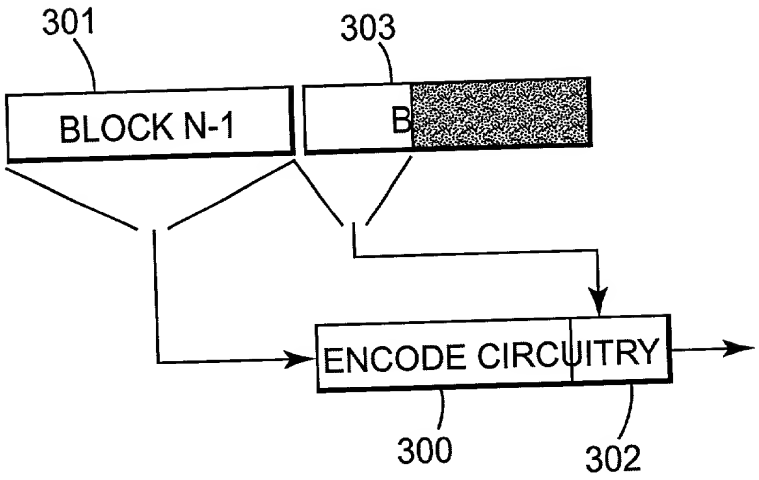
301
303
BLOCK N-1
B
ENCODE CIRCUITRY
300
302

Fig. 7

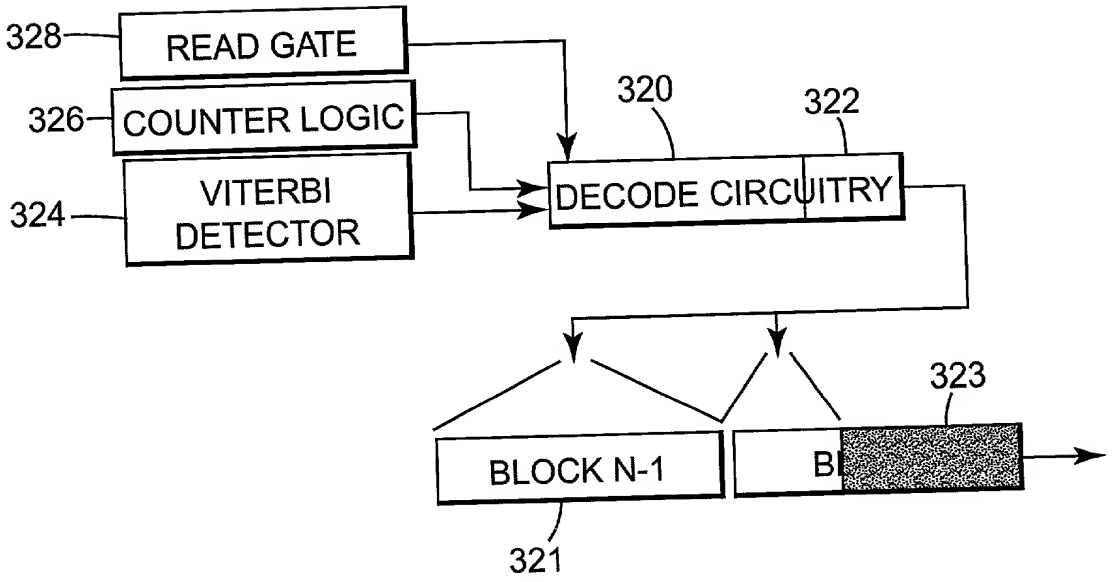
328
READ GATE
326
COUNTER LOGIC
324
VITERBI DETECTOR
320
322
DECODE CIRCUITRY
323
BLOCK N-1
B
321

Fig. 8

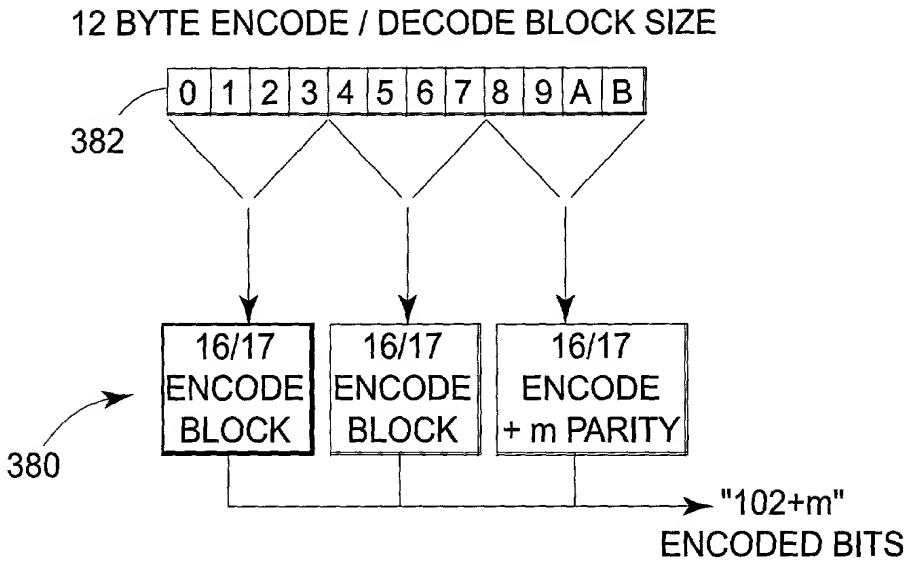
12 BYTE ENCODE / DECODE BLOCK SIZE
0 1 2 3 4 5 6 7 8 9 A B
382
16/17 ENCODE BLOCK
16/17 ENCODE BLOCK
16/17 ENCODE + m PARITY
380
"102+m" ENCODED BITS

Fig. 9

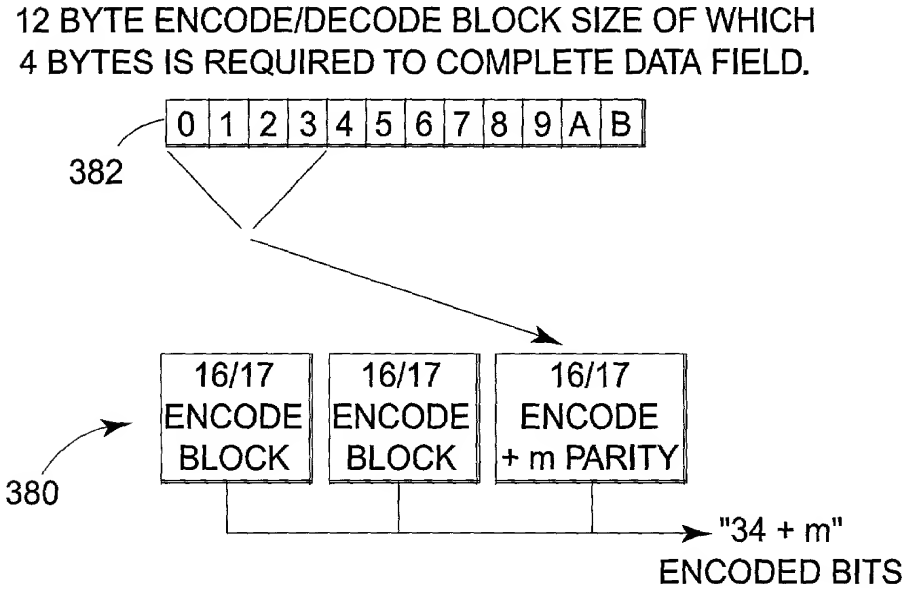
12 BYTE ENCODE/DECODE BLOCK SIZE OF WHICH
4 BYTES IS REQUIRED TO COMPLETE DATA FIELD.
0 1 2 3 4 5 6 7 8 9 A B
382
16/17 ENCODE BLOCK
16/17 ENCODE BLOCK
16/17 ENCODE + m PARITY
380
"34 + m" ENCODED BITS

Fig. 10

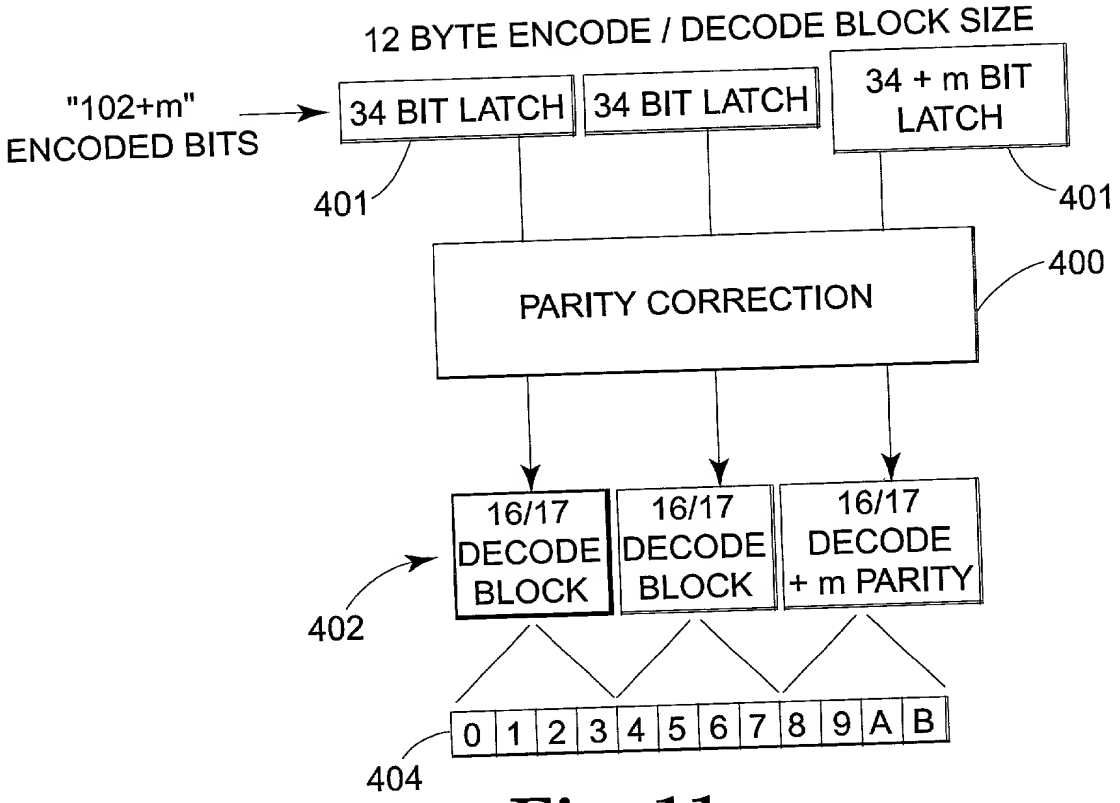
12 BYTE ENCODE / DECODE BLOCK SIZE
"102+m"
ENCODED BITS
34 BIT LATCH
34 BIT LATCH
34 + m BIT LATCH
401
401
PARITY CORRECTION
400
16/17 DECODE BLOCK
16/17 DECODE BLOCK
16/17 DECODE + m PARITY
402
0 1 2 3 4 5 6 7 8 9 A B
404

Fig. 11

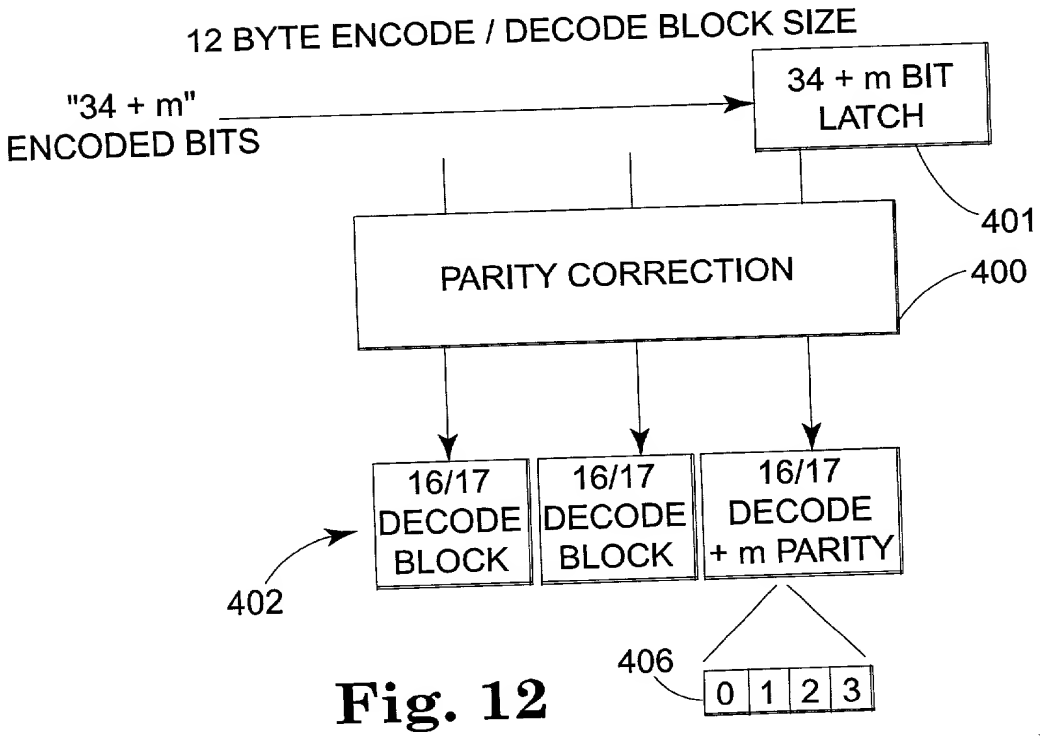
12 BYTE ENCODE / DECODE BLOCK SIZE
"34 + m"
ENCODED BITS
34 + m BIT LATCH
401
PARITY CORRECTION
400
16/17 DECODE BLOCK
16/17 DECODE BLOCK
16/17 DECODE + m PARITY
402
406
0 1 2 3

Fig. 12